



SEQUENCE LISTING

<110> Andersen, Peter
Skjot, Rikke Louise Vinther
Okkels, Li Mei Meng
Brock, Inger
Oettinger, Thomas

<120> Nucleic Acid Fragments and Polypeptide Fragments Derived from M.
Tuberculosis

<130> 670001-2002.6

<140> 09/872,505

<141> 2001-06-01

<150> 09/804,980

<151> 2001-03-13

<150> US09/615,947

<151> 2000-07-13

<150> US09/246,191

<151> 1998-12-30

<150> 60/070,488

<151> 1998-01-05

<150> 60/144,011

<151> 1999-07-15

<150> PCT/DK00/00398

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aac gcc ccg cgt cgg aat cgc gtt ggg cgg caa cat ggt tgg ccg gcc	96
Asn Ala Pro Arg Arg Asn Arg Val Gly Arg Gln His Gly Trp Pro Ala	
20 25 30	

gac gtt ccg tcc gcc gag cag cgc cgc gcc caa cgg cag cgc gac ctc	144
Asp Val Pro Ser Ala Glu Gln Arg Arg Ala Gln Arg Gln Arg Asp Leu	
35 40 45	

gag gct atc cgc cga gcg tac gcc gag atg gtg gcg aca tca cac gaa	192
Glu Ala Ile Arg Arg Ala Tyr Ala Glu Met Val Ala Thr Ser His Glu	
50 55 60	

atc gac gac gac aca gcc gaa ctg gcg ctg ttg tcg atg cat ctc gac	240
Ile Asp Asp Asp Thr Ala Glu Leu Ala Leu Leu Ser Met His Leu Asp	
65 70 75 80	

gat gag cag cgc cgg ctt gag gcg ggg atg aag ctc ggc tgg cat ccg	288
Asp Glu Gln Arg Arg Leu Glu Ala Gly Met Lys Leu Gly Trp His Pro	
85 90 95	

tat cac ttc ccc gac gaa ccc gac agc aaa cag tga	324
Tyr His Phe Pro Asp Glu Pro Asp Ser Lys Gln	
100 105	

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20 25 30															
Asp Val Pro Ser Ala Glu Gln Arg Arg Ala Gln Arg Gln Arg Asp Leu															
35 40 45															
Glu Ala Ile Arg Arg Ala Tyr Ala Glu Met Val Ala Thr Ser His Glu															
50 55 60															
Ile Asp Asp Asp Thr Ala Glu Leu Ala Leu Leu Ser Met His Leu Asp															
65 70 75 80															
Asp Glu Gln Arg Arg Leu Glu Ala Gly Met Lys Leu Gly Trp His Pro															
85 90 95															
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1 5 10 15															

gag ctt gtc ggc ggc ccg cca gtc gag gct tcg gcc gcc gcg ctg gcc	96
Glu Leu Val Gly Gly Pro Pro Val Glu Ala Ser Ala Ala Ala Leu Ala	

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ggc gac gcc gcg ggc gca tgg cgg acc gcg gcc gtc gag ctt gcg cga				144
Gly Asp Ala Ala Gly Ala Trp Arg Thr Ala Ala Val Glu Leu Ala Arg				
	35	40	45	
gcg ttg gtc cgc gct gtg gcg gag tcg cac ggc gtc gcg gcc gtt ttg				192
Ala Leu Val Arg Ala Val Ala Glu Ser His Gly Val Ala Ala Val Leu				
	50	55	60	
ttc gcc gcg acg gcc gcc gcg gcg gcg gcc gtc gac cgg ggt gat ccg				240
Phe Ala Ala Thr Ala Ala Ala Ala Ala Val Asp Arg Gly Asp Pro				
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Pro				

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Gly Asp Ala Ala Gly Ala Trp Arg Thr Ala Ala Val Glu Leu Ala Arg				
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Ala Leu Val Arg Ala Val Ala Glu Ser His Gly Val Ala Ala Val Leu				
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Phe Ala Ala Thr Ala Ala Ala Ala Ala Val Asp Arg Gly Asp Pro				
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Pro				

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Pro Pro Glu Leu Asn Thr Ala Arg Leu Met Ala Gly Ala Gly Pro Ala			
10	15	20	25

cca atg ctt gcg gcg gcc gcg gga tgg cag acg ctt tcg gcg gct ctg	150		
Pro Met Leu Ala Ala Ala Ala Gly Trp Gln Thr Leu Ser Ala Ala Leu			
	30	35	40

gac gct cag gcc gtc gag ttg acc gcg cgc ctg aac tct ctg gga gaa	198
Asp Ala Gln Ala Val Glu Leu Thr Ala Arg Leu Asn Ser Leu Gly Glu	
45 50 55	
gcc tgg act gga ggt ggc agc gac aag gcg ctt gcg gct gca acg ccg	246
Ala Trp Thr Gly Gly Gly Ser Asp Lys Ala Leu Ala Ala Thr Pro	
60 65 70	
atg gtg gtc tgg cta caa acc gcg tca aca cag gcc aag acc cgt gcg	294
Met Val Val Trp Leu Gln Thr Ala Ser Thr Gln Ala Lys Thr Arg Ala	
75 80 85	
atg cag gcg acg gcg caa gcc gcg gca tac acc cag gcc atg gcc acg	342
Met Gln Ala Thr Ala Gln Ala Ala Ala Tyr Thr Gln Ala Met Ala Thr	
90 95 100 105	
acg ccg tcg ctg ccg gag atc gcc gcc aac cac atc acc cag gcc gtc	390
Thr Pro Ser Leu Pro Glu Ile Ala Ala Asn His Ile Thr Gln Ala Val	
110 115 120	
ctt acg gcc acc aac ttc ttc ggt atc aac acg atc ccg atc gcg ttg	438
Leu Thr Ala Thr Asn Phe Phe Gly Ile Asn Thr Ile Pro Ile Ala Leu	
125 130 135	
acc gag atg gat tat ttc atc cgt atg tgg aac cag gca gcc ctg gca	486
Thr Glu Met Asp Tyr Phe Ile Arg Met Trp Asn Gln Ala Ala Leu Ala	
140 145 150	
atg gag gtc tac cag gcc gag acc gcg gtt aac acg ctt ttc gag aag	534
Met Glu Val Tyr Gln Ala Glu Thr Ala Val Asn Thr Leu Phe Glu Lys	
155 160 165	
ctc gag ccg atg gcg tcg atc ctt gat ccc ggc gcg agc cag agc acg	582
Leu Glu Pro Met Ala Ser Ile Leu Asp Pro Gly Ala Ser Gln Ser Thr	
170 175 180 185	
acg aac ccg atc ttc gga atg ccc tcc cct ggc agc tca aca ccg gtt	630
Thr Asn Pro Ile Phe Gly Met Pro Ser Pro Gly Ser Ser Thr Pro Val	
190 195 200	
ggc cag ttg ccg ccg gcg gct acc cag acc ctc ggc caa ctg ggt gag	678
Gly Gln Leu Pro Pro Ala Ala Thr Gln Thr Leu Gly Gln Leu Gly Glu	
205 210 215	
atg agc ggc ccg atg cag cag ctg acc cag ccg ctg cag cag gtg acg	726
Met Ser Gly Pro Met Gln Gln Leu Thr Gln Pro Leu Gln Gln Val Thr	
220 225 230	
tcg ttg ttc agc cag gtg ggc ggc acc ggc ggc ggc aac cca gcc gac	774
Ser Leu Phe Ser Gln Val Gly Gly Thr Gly Gly Gly Asn Pro Ala Asp	
235 240 245	
gag gaa gcc gcg cag atg ggc ctg ctc ggc acc agt ccg ctg tcg aac	822
Glu Glu Ala Ala Gln Met Gly Leu Leu Gly Thr Ser Pro Leu Ser Asn	
250 255 260 265	

cat ccg ctg gct ggt gga tca ggc ccc agc gcg ggc gcg ggc ctg ctg	870
His Pro Leu Ala Gly Gly Ser Gly Pro Ser Ala Gly Ala Gly Leu Leu	
270 275 280	
cgc gcg gag tcg cta cct ggc gca ggt ggg tcg ttg acc cgc acg ccg	918
Arg Ala Glu Ser Leu Pro Gly Ala Gly Gly Ser Leu Thr Arg Thr Pro	
285 290 295	
ctg atg tct cag ctg atc gaa aag ccg gtt gcc ccc tcg gtg atg ccg	966
Leu Met Ser Gln Leu Ile Glu Lys Pro Val Ala Pro Ser Val Met Pro	
300 305 310	
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Ala Ala Ala Ala Gly Ser Ser Ala Thr Gly Gly Ala Ala Pro Val Gly	
315 320 325	
gcg gga gcg atg ggc cag ggt gcg caa tcc ggc ggc tcc acc agg ccg	1062
Ala Gly Ala Met Gly Gln Gly Ala Gln Ser Gly Gly Ser Thr Arg Pro	
330 335 340 345	
ggt ctg gtc gcg ccg gca ccg ctc gcg cag gag cgt gaa gaa gac gac	1110
Gly Leu Val Ala Pro Ala Pro Leu Ala Gln Glu Arg Glu Glu Asp Asp	
350 355 360	
gag gac gac tgg gac gaa gag gac gac tgg tgagctcccg taatgacaac	1160
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35 40 45	
Thr Ala Arg Leu Asn Ser Leu Gly Glu Ala Trp Thr Gly Gly Gly Ser	
50 55 60	
Asp Lys Ala Leu Ala Ala Thr Pro Met Val Val Trp Leu Gln Thr	
65 70 75 80	
Ala Ser Thr Gln Ala Lys Thr Arg Ala Met Gln Ala Thr Ala Gln Ala	
85 90 95	
Ala Ala Tyr Thr Gln Ala Met Ala Thr Thr Pro Ser Leu Pro Glu Ile	
100 105 110	
Ala Ala Asn His Ile Thr Gln Ala Val Leu Thr Ala Thr Asn Phe Phe	
115 120 125	
Gly Ile Asn Thr Ile Pro Ile Ala Leu Thr Glu Met Asp Tyr Phe Ile	
130 135 140	
Arg Met Trp Asn Gln Ala Ala Leu Ala Met Glu Val Tyr Gln Ala Glu	
145 150 155 160	
Thr Ala Val Asn Thr Leu Phe Glu Lys Leu Glu Pro Met Ala Ser Ile	

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Leu	Asp	Pro	Gly	Ala	Ser	Gln	Ser	Thr	Thr	Asn	Pro	Ile	Phe	Gly	Met	
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225					230				235					240		
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	290				295				300							
Lys	Pro	Val	Ala	Pro	Ser	Val	Met	Pro	Ala	Ala	Ala	Ala	Gly	Ser	Ser	
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Asp	Asp	Trp														
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 Asn Ala

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 Gln His

<210> 9
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 Ala Glu

<210> 10
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Asp Leu

<210> 11
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Glu Ala

<210> 15
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Tyr His

<210> 16

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<213> Mycobacterium tuberculosis

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<212> PRT

<213> Mycobacterium tuberculosis

<400> 17

Met Ser Gly His Ala Leu Ala Ala Arg Thr Leu Leu Ala Ala Ala Asp
1 5 10 15
Glu Leu

<210> 18

<211> 18

<212> PRT

<213> Mycobacterium tuberculosis

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Ala Ala Asp Glu Leu Val Gly Gly Pro Pro Val Glu Ala Ser Ala Ala
1 5 10 15
Ala Leu

<210> 19

<211> 18

<212> PRT

<213> Mycobacterium tuberculosis

<400> 19

Ala Ser Ala Ala Ala Leu Ala Gly Asp Ala Ala Gly Ala Trp Arg Thr
1 5 10 15
Ala Ala

<210> 20

<211> 18

<212> PRT

<213> Mycobacterium tuberculosis

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Ala Trp Arg Thr Ala Ala Val Glu Leu Ala Arg Ala Leu Val Arg Ala
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Val Ala

<210> 21

<211> 18

<212> PRT

<213> *Mycobacterium tuberculosis*

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1 5 10 15
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<210> 22

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<212> PRT

<213> Mycobacterium tuberculosis

<400> 22

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<210> 23

<211> 18

<212> PRT

<213> Mycobacterium tuberculosis

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<210> 24

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<212> PRT

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Thr Asn

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1 5 10 15
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<210> 29
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<212> PRT
<213> Mycobacterium tuberculosis

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1 5 10 15
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<210> 32
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 Ala Gly

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 Leu Pro

<210> 37
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 <212> PRT
 <213> Mycobacterium tuberculosis

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 Thr Pro

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1 5 10 15
Pro Val

<210> 39
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Ala Ala

<210> 40
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<210> 42
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1 5 10 15
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1 5 10 15
Glu Asp

<210> 44

<211> 18
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1 5 10 15
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<210> 45
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<213> Mycobacterium tuberculosis

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<210> 46
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<212> PRT
<213> Mycobacterium tuberculosis

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1 5 10 15
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<210> 47
<211> 18
<212> PRT
<213> Mycobacterium tuberculosis

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Pro Met Leu Ala Ala Ala Ala Gly Trp Gln Thr Leu Ser Ala Ala Leu
1 5 10 15
Asp Ala

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Leu Asn

<210> 49
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<210> 50

<211> 18

<212> PRT

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1

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10

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Thr Pro

<210> 51

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<212> PRT

<213> Mycobacterium tuberculosis

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5

10

15

Ser Thr

<210> 52

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<212> PRT

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<400> 52

Val Trp Leu Gln Thr Ala Ser Thr Gln Ala Lys Thr Arg Ala Met Gln

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5

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Ala Thr

<210> 53

<211> 18

<212> PRT

<213> Mycobacterium tuberculosis

<400> 53

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5

10

15

Ala Met

<210> 54

<211> 18

<212> PRT

<213> Mycobacterium tuberculosis

<400> 54

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5

10

15

Ala Ala

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<213> Mycobacterium tuberculosis

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<210> 56
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 <213> Mycobacterium tuberculosis

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<210> 57
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 1 5 10 15
 Leu Thr

<210> 58
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<400> 58
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 Trp Asn

<210> 59
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<220>
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<210> 60
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<220>
 <223> Primer PB2653c

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<210> 61
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<212> DNA
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<220>
<223> Primer PA2654c

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30

<210> 62
<211> 30
<212> DNA
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<220>
<223> Primer PB2654c

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<210> 63
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<220>
<223> Primer Rv2653-F

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<220>
<223> Primer Rv2653-R

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<212> DNA
<213> Artificial Sequence

<220>
<223> Primer Rv2654-F

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48

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